



**Risk Mitigation Consulting Inc.**

*Intelligence and Analysis Division*

# OPEN SOURCE UPDATE

April 2021

## **INTENT**

This open source periodical is designed to provide an overview of relevant, publicly available information on threat and hazard events and analysis of potential impacts to the interests of the United States, both at home and abroad. This product is not intended to be a comprehensive overview of all threat and hazard news and inclusion in this product does not constitute a confirmation of credibility nor precedence by RMC.



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## Threats

### **Ammunition, Explosives Stolen at California Marine Corps Bases – *Insider Threat***

**Summary:** Approximately 10 pounds of C-4 explosive was reported missing from Marine Corps Air Ground Combat Center (MCAGCC) Twentynine Palms. According to installation officials, the explosives are presumed to have been stolen, and the Naval Criminal Investigative Service (NCIS) is leading an investigation into the apparent theft.

The recent incident onboard MCAGCC Twentynine Palms remains under investigation, and no suspects or motive have yet to be identified.

In a separate (but similar) incident at Marine Corps Base (MCB) Camp Pendleton, at least 5 Marines are facing charges or investigations for the theft of thousands of rounds of ammunition along with an unknown quantity of explosives. NCIS is also leading the investigation into the incident at MCB Camp Pendleton. One Marine was taken into custody after an online sting operation involving the sale of the stolen munitions.

Additionally, there have been a number of other incidents of insider theft of military weaponry, ordnance, and equipment in recent years, highlighting the potential for insider theft incidents.

**Analyst Comment:** Such incidents can affect readiness and can result in various policy changes at various command levels. However, these incidents are also particularly concerning when linked to extremist or gang activity. Military members may engage in property theft for profit alone, or may be motivated by ideological reasons or affiliation with a gang or extremist group. Additionally, military personnel are appealing recruits for such groups due to their insider access to military weaponry, ordnance, and equipment.

The status of the C-4 stolen from MCAGCC Twentynine Palms remains unclear, and it remains unclear whether there is a gang or extremist nexus related to the theft. Though the full details of the investigation at MCB Camp Pendleton are also unclear, the Marine who was taken into custody following the sting operation was reportedly selling the ammunition, which could potentially be related to elevated demand/prices for ammunition amidst the COVID-19 pandemic and sporadic civil unrest throughout the country. Still, a purchaser of ammunition in military calibers (which are relatively common among civilian-owned firearms) may have a lawful end use to include hunting and target shooting, while explosives are more likely to be sought out by individuals or group with more malicious intent, such as perpetrating a terror attack.

Sources: <https://www.marinecorpstimes.com/news/your-marine-corps/2021/02/04/several-pounds-of-c-4-explosives-are-missing-from-california-marine-base/>

<https://www.military.com/daily-news/2021/03/31/marines-under-investigation-after-ammo-explosives-reportedly-go-missing-pendleton.html>



## Individuals on Terror Watch Lists Apprehended Near Southern Border – *Terrorism*

**Summary:** A congressional aide familiar with Customs and Border Protection (CBP) information told a media outlet that four migrants with names on the FBI's terror watch list (three from Yemen and one from Serbia) were picked up at the southern border by U.S. Border Patrol since the beginning of the fiscal year in October 2020. Additional reporting indicates that at least two of the Yemeni nationals were apprehended near San Diego, CA after entering the U.S. illegally (one in January 2021 and one in March 2021).

In the first incident, officials said a 33-year-old man from Yemen who was on the FBI's Terrorism Watch List as well as on the No-Fly list was apprehended on 29 January. A cellular phone sim card hidden underneath the insole of his shoe was also found, agents said. He was later transferred into custody by U.S. Immigration and Customs Enforcement (ICE).

In the second incident, officials said a 26-year-old man from Yemen, who was also on the FBI's Terrorism Watch List and on the No-Fly list, was apprehended 30 March and is being held in federal custody pending removal.

While these apprehensions do not necessarily indicate that the individuals involved were actively involved in terrorist activity, the incidents highlight the potential for terrorists to enter the country across the U.S.' borders illegally.

**Analyst Comment:** Per a U.S. Department of State crime and safety assessment from June 2020, "the threat posed by violent extremist groups in Yemen remains high. Al-Qa'ida in the Arabian Peninsula (AQAP) has expanded its influence in Yemen since the beginning of the [ongoing civil war in the region]. Because of the instability and violence in Yemen, the internationally recognized government cannot effectively enforce counterterrorism measures and a large security vacuum persists. AQAP has benefitted from the conflict by significantly expanding its presence in the southern and eastern governorates. ISIS also has established a presence in Yemen, and has claimed responsibility for several deadly attacks throughout Yemen since 2016."

Concerns remain that operatives from AQAP, ISIS, or other terror groups could potentially target the U.S. in transnational terrorist activities, to include travelling to the U.S. in order to launch attacks. Illegal border crossings remain an appealing method for terrorists entering the U.S., as typical entry via legal channels (such as land border crossings or airports) allow authorities to cross-reference all entrants through relevant security databases. Per the Department of Homeland Security, an average of 10 individuals on the terrorist watchlist are stopped from entering the U.S. per day, primarily at airports.

Sources: [https://www.axios.com/four-people-matching-terror-watchlist-arrested-at-border-86b44533-4aae-4b73-b509-0501c90c370a.html?utm\\_campaign=organic&utm\\_medium=socialshare&utm\\_source=twitter](https://www.axios.com/four-people-matching-terror-watchlist-arrested-at-border-86b44533-4aae-4b73-b509-0501c90c370a.html?utm_campaign=organic&utm_medium=socialshare&utm_source=twitter)



<https://losangeles.cbslocal.com/2021/04/05/border-patrol-arrest-yemeni-terror-watch-list/>

<https://www.dhs.gov/news/2019/01/07/mythfact-known-and-suspected-terrorists-special-interest-aliens>

<https://www.osac.gov/Content/Report/70c8f435-dd22-4b4f-a44e-18e37e2723ee>

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## **Navy Medic Shoots Two People, Killed by Police at Nearby Fort Detrick – *Active Shooter/Active Assailant***

**Summary:** A corpsman that worked at the Navy Medical Research Center laboratory at Fort Detrick, Maryland shot two fellow sailors at the nearby Riverside Tech Park on Tuesday, 06 April 2021. The sailors were working at a warehouse rented by the Navy. Afterward, he drove past the gate at Fort Detrick nearby before he was shot and killed by military police. Open source reporting states that one of the victims is in critical condition, while the other was released from the hospital the same day. Details and the motive for the shooting are unclear. Surveillance video showed the assailant entering the building with a rifle as his victims tried to evade him. It was unclear whether the rifle was service-issued or not. After the shooting, the corpsman fled towards Fort Detrick. Gate guards had been given advance notice of an active shooter, along with a vehicle description. When he attempted to enter the base, they asked him to pull over to search the vehicle. The corpsman ignored them and drove a half-mile into the installation. He was stopped by military police in a parking lot. Upon emerging from the vehicle, he brandished the rifle. The police immediately shot and killed him. The assailant enlisted in September 2012. Open source reporting does not mention previous disciplinary issues. In fact, he had been awarded a Good Conduct Medal, a National Defense Service Medal and a Global War on Terrorism Service Medal. His rank at the time of death was Hospital Corpsman 3rd Class. Fort Detrick is home to the military's flagship biological defense laboratory and several federal civilian biodefense labs. About 10,000 military personnel and civilians work on the base, which encompasses about 1,300 acres in the city of Frederick, Maryland.

**Analyst Comment:** While authorities are still searching for a motive, evidence is emerging that the corpsman who shot the sailors at an office park may have targeted at least one of them. All three were assigned to Fort Detrick, but whether or not the shooter worked with any of the victims has not yet been reported. A witness at another business in the complex assisted one of the sailors by hiding him in a bathroom. He stated that the shootings seemed targeted and not random. Open sources mentioned no history of disciplinary or mental health issues in the assailant's service record. There has been a recent uptick in civilian active shooter incidents, including in Orange, California; Boulder, Colorado; and, Atlanta, Georgia. Some experts have argued that media coverage of shootings may inspire "copycat" assailants to carry out similar attacks. Active shooters' motives are varied, including personal and/or political grievances. Past shooters have also been compelled by untreated mental illness. In 2011, an assailant shot U.S. Representative Gabby Giffords and 12 others, killing six. He was later found to be suffering from paranoid schizophrenia. He had spent years prior fixating on conspiracy theories. Some assailants are also suicidal and intend to kill others in the process of shooting themselves or encouraging law



enforcement to do so. None of these explanations for the shooting near Fort Detrick has yet been established, as investigators are now left to determine what motivated the corpsman.

Sources: <https://www.navytimes.com/news/your-navy/2021/04/06/navy-corpsman-killed-by-base-personnel-after-active-shooting-authorities-say/>

<https://www.navytimes.com/news/your-navy/2021/04/08/navy-medic-who-shot-2-was-assigned-to-fort-detrick-medical-research-center/>

<https://www.npr.org/sections/health-shots/2019/08/06/748767807/mass-shootings-can-be-contagious-research-shows>

<https://www.nytimes.com/2011/05/26/us/26loughner.html>

[https://www.secretservice.gov/sites/default/files/2020-04/Jared\\_Loughner\\_Using\\_Systems.pdf](https://www.secretservice.gov/sites/default/files/2020-04/Jared_Loughner_Using_Systems.pdf)

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## **Tensions Rise After Iranian Nuclear Site Sabotage – *Foreign Nation-State Military***

**Summary:** On Monday, 12 April 2021, the centrifuges in Iran’s underground Natanz nuclear facility were damaged in what officials in Tehran described as an attack by Israel. While the Israeli government did not claim responsibility, its media reported that the damage was the result of a cyberattack by its own special forces or the Mossad intelligence agency. The incident caused a blackout that affected power distribution before emergency systems came online. Iran responded by pledging to increase uranium enrichment to 60%. A nuclear weapon would require enrichment to 90%. Both the incident and Iran’s response heighten tension amid efforts to reestablish the Joint Comprehensive Plan of Action (JCPOA, or “the Iran Nuclear deal”) signed between Iran and the United Nations Security Council in 2015. In 2018, then-President Donald Trump declined to recertify the JCPOA, after asserting that Iran had failed to meet conditions outlined in the plan. In the interim, inspections in 2019 by the International Atomic Energy Agency confirmed that Iran had enriched uranium in excess of the deal’s limits. In 2020, following the assassination of Major General Qasem Soleimani, Iran confirmed that it would not adhere to the agreed-upon limits. Since his inauguration, President Joe Biden has sought to renegotiate and recertify JCPOA. Talks in Vienna between diplomats representing the five member nations of the UN Security Council and Germany resumed on Thursday, 16 April 2021.

**Analyst Comment:** Details on the incident at the Natanz nuclear facility are still scant. Open source media has suggested a cyberattack, but Iran has alluded to the presence of saboteurs. In late 2009 or early 2010, Iran decommissioned and replaced about 1,000 centrifuges in Natanz after a similar attack. It is widely believed that the STUXNET virus was responsible. The virus is believed to be a co-creation of the United States and Israel that was designed to attack SCADA systems. Because the systems operating the centrifuges were air-gapped (on a network isolated from the wider Internet), the virus was likely uploaded by an operative or a collaborator using a direct approach such as a portable USB drive. In July 2020, there was also an explosion at Natanz caused by a bomb smuggled inside of a desk. This most recent attack on Natanz carries as much symbolic



impact as it does strategic. It also highlights the ongoing “shadow war” between Iran and Israel that has escalated in recent months, including maritime attacks on both naval and shipping targets. Hostilities have also played out in the battlefields of Syria, where Israel has struck Iranian assets there to support the Bashar al-Assad government. The Natanz incident comes at a delicate time for all involved, as Iran seeks to maintain and enhance its nuclear program while also negotiating with representatives from the UN Security Council. Responding to the Israeli attack would undermine any traction Tehran might gain in the talks. Ignoring them heightens domestic tensions between those who would negotiate with the international community and hardliners who would exit the talks altogether. The United States is also faced with supporting its allies in Israel while asking Iran to negotiate in good faith. Regardless, the line between a shadow war and a conventional one is rapidly fading.

Sources: <https://apnews.com/article/world-news-israel-iran-62a7aa3182992ed0f97b5486d71280c2>

<https://www.bbc.com/news/world-middle-east-56722181>

<https://www.reuters.com/article/us-iran-nuclear-limit/irans-stock-of-enriched-uranium-exceeds-nuclear-deals-limit-iaea-says-idUSKCN1TW2TG?>

<https://www.bbc.com/news/world-middle-east-51001167>

<https://www.nytimes.com/2021/04/15/world/europe/iran-nuclear-talks.html>

[https://isis-online.org/uploads/isis-reports/documents/stuxnet\\_FEP\\_22Dec2010.pdf](https://isis-online.org/uploads/isis-reports/documents/stuxnet_FEP_22Dec2010.pdf)

<https://www.f5.com/labs/articles/cisotociso/attacking-air-gap-segregated-computers>

<https://www.atlanticcouncil.org/blogs/iransource/israels-shadow-war-with-iran-risks-playing-out-in-the-open/>

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## **Minneapolis Awaits Chauvin Trial Conclusion, Potential Unrest – *Civil Disturbance***

**Summary:** In March 2021, it was announced that a settlement was reached between the family of George Floyd and the city of Minneapolis. The payment of \$27 million is reportedly the largest ever reached before trial in a civil rights wrongful death lawsuit involving the police. This settlement was reported as the jury for the trial of Derek Chauvin was being chosen. Chauvin will face charges of manslaughter, second-degree murder and third-degree murder in the death of George Floyd. Previous wrongful death lawsuits and murder charges surrounding the death of black men and women at the hands of law-enforcement have frequently spurred protest activity. Legal stages such as settlement outcomes and the results of related trials are lightning rods for protest activity on a varying scale.



**Analyst Comment:** On 11 April, Daunte Wright (a black man from Minneapolis) was shot dead by a police officer. A state of emergency was declared in Minneapolis the Monday and Tuesday following the killing. The declaration and accompanying curfew were intended to quell anticipated civil unrest. Hundreds of protests gathered, and the events were predominantly peaceful, though 79 people were arrested for a variety of charges. General protests and marches against police brutality have occurred frequently throughout the city as well in recent weeks. Now, as of 19 April, the city is bracing for the verdict of Chauvin's trial. The atmosphere of Minneapolis is particularly tense following the recent shooting of Wright and the soon to be released verdict. There is a possibility that rallies, protests, and demonstrations will occur in conjunction with the trial's revelations and results. Such events have the possibility of leading to property crime and/or violent crime. In anticipation of this, some local shop owners have boarded up their properties and law enforcement has prepared for widespread civil unrest.

Sources: <https://www.nytimes.com/2021/03/12/us/george-floyd-minneapolis-settlement.html>

<https://www.nytimes.com/2021/04/19/us/derek-chauvin-trial-verdict-george-floyd.html?action=click&module=Spotlight&pgtype=Homepage>

<https://www.msn.com/en-us/news/politics/maxine-waters-calls-for-protesters-to-get-more-confrontational-if-no-guilty-verdict-is-reached-in-derek-chauvin-trial/ar-BB1fP0B9?ocid=BingNewsSearch>

<https://news.yahoo.com/mayors-office-no-curfew-minneapolis-195600693.html?guccounter=1>

<https://www.msn.com/en-us/news/us/state-of-emergency-declared-in-minneapolis-with-new-curfew/ar-BB1fzsA9>

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## City of Miami Beach Reacts to Spring Break Unrest – *Civil Disturbance*

**Summary:** The rising number of Spring Break attendees in Miami Beach this year culminated in a curfew of 8:00 p.m. to 6:00 a.m. in late March that lasted until 06 April 2021. The curfew was accompanied by a 10:00 p.m. shutdown of the eastbound lanes of the MacArthur, Julia Tuttle and Venetian causeways from Thursday through Sunday. Partygoers began arriving in late February, but the celebrations escalated into civil unrest that led to over 1,000 arrests in the days leading to the weekend of 19-21 March 2021. Miami Beach police officers also used pepper balls on the crowd after many partygoers refused to disperse. At least eight firearms were seized, and a fight lead to a stampede at a restaurant resulted in one woman hospitalized for a cut. More than half of the arrests were of tourists from out of state. By the end of March, Miami Beach residents began to protest outside of City Hall, complaining that vacationers were committing crimes and destroying property. Many, they said, were carrying alcoholic beverages rather than spending money at local businesses. The cancellation of concerts and festivals due to COVID-19 may have driven more tourists onto Ocean Drive in the MXC Entertainment District, creating a chaotic street party. Miami Beach often hosts a raucous Spring Break season. The city has attempted to calm the parties with a series of mounting regulations, including banning scooter rentals after 7:00 p.m. and alcohol sales after 8:00 p.m. However, new restrictions have not kept partygoers from crowding





Ocean Drive with cars and pedestrians playing music, dancing, and socializing. This year continues an ongoing conflict between Miami Beach businesses seeking tourist dollars and residents seeking calm.

**Analyst Comment:** Florida's reputation as a state with looser restrictions during the COVID-19 pandemic may have drawn an unusually large number of tourists for this year's Spring Break. Restrictions on businesses and social activities vary from state-to-state, depending on local lawmakers, virus numbers, state law, and several other factors. As lockdowns are implemented, modified, and withdrawn, tourists may seek destination events in the months leading to Summer. Would-be partygoers are likely to become impatient with a second Spring and Summer marred by restrictions, even as vaccines are distributed nationwide. The events that transpired in South Beach Miami were unfortunate, and they may not be the last of their kind this year. The use of law enforcement to disperse crowds comes at a time of heightened political and social tension following the civil unrest of 2020. Property destruction and other crimes committed by partygoers are cited as justification for the measures taken by local officials. However, social justice activists have criticized the police presence as targeted or fueled by ulterior motives. Regardless, the push-and-pull between businesses, residents, and city government is unlikely to abate in the near future.

Sources: <https://www.miamiherald.com/news/local/community/miami-dade/miami-beach/article250507634.html>

<https://www.miamiherald.com/news/local/community/miami-dade/miami-beach/article250103594.html>

<https://www.miamiherald.com/article250257735.html>

<https://apnews.com/article/miami-south-beach-spring-break-coronavirus-edd4a28c41892586bddb7616ba42ef78>

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## Hazards

### Eruption of La Soufrière – *Geological Hazards*

**Summary:** The volcano known as La Soufrière has experienced a series of eruptions beginning on 09 April. La Soufrière let out a massive explosion on April 12 that created a dense and fast flow of lava and ash down the south and southwest sides of the volcano. According to local officials, water is running short as falling ash has contaminated water reservoirs. Ashfall has also impacted nearby islands including Barbados. The volcano, which had seen a low-level eruption since December, experienced the first of several major explosions on the morning of 09 April, and volcanologists say activity could continue for weeks. Another explosion was reported the morning of 10 April, sending another massive plume of ash into the air. It came on the anniversary of the 1979 eruption. A previous eruption in 1902 killed some 1,600 people.

**Analyst Comment:** St. Vincent and the Grenadines is a country consisting of 32 islands in the Caribbean, west of Barbados and north of Trinidad and Tobago. The highest peak in the county is the volcano, La Soufrière, at 1,234 m. and located on the main island of St. Vincent. Since 1718, five eruptions have been recorded. The most recent, prior to this occurrence, was in 1979. However, the latest eruptions are more akin to the 1902 eruption.

Between 16,000 to 20,000 people have been evacuated from the island's northern region, where the exploding volcano is located, with more than 3,000 of them staying at more than 80 government shelters. As flights in the region are cancelled, evacuees have had to rely on transportation via waterways. The inability of flights through ash-fall will also hinder any potential rescue efforts and the delivery of supplies to the islands. COVID-19 presents a further complication among this disaster. At least 14 new cases of COVID-19 have been reported since the eruptions began. More than 4,000 people are in 89 government shelters. As they arrive, individuals are tested and quarantined if necessary. An additionally 6,000 evacuees are in private homes.

*Sources:* <https://abcnews.go.com/Technology/wireStory/st-vincent-seeks-water-funds-volcano-erupting-77044857>

<https://apnews.com/article/la-soufriere-volcano-eruption-st-vincent-caribbean-2c26166fa05e0ec6840669972ea1aaf0>

<https://www.usnews.com/news/world/articles/2021-04-15/st-vincent-fears-covid-19-outbreak-with-volcano-evacuations>

<https://www.msn.com/en-us/weather/topstories/photos-capture-the-unfolding-volcano-crisis-in-st-vincent/ss-BB1fJdPM?ocid=BingNewsSearch>



## Flash Floods on Maui – *Meteorological Hazards*

**Summary:** On the island of Maui in Hawaii, a state of emergency was declared in late January due to severe flooding. Maui County in particular has been impacted by the heavy rain. The flash floods caused a local dam to be breached and overflow, one bridge to be washed out, another bridge to be 'displaced', homes destroyed, residents stranded, and local evacuations announced. Large power outages were also reported. Maui County is experiencing these flash floods amidst an ongoing extreme drought. On 27 January 2021, an emergency order was issued declaring a disaster due to drought conditions. Storms that hit regions experiencing drought can drop water quickly and in such quantities that the soil is unable to absorb the water, resulting in a flash flood. Additionally, this combination of flashfloods, dry soils, and steep slopes as found across Hawaii, can often lead to landslides or mudslides. Maui reported landslides during these flash flood events.

**Analyst Comment:** Flooding was triggered by heavy storm systems slowing down and remaining on the windward side of Oahu. The mayor of Maui reported that the flooding was the worst in over 25 years. While storms at that time of year are common for the area, this was an extreme level of rainfall and flooding. This falls in line with the climate trends seen across the globe. A warmer climate tends to amplify existing weather patterns, and as the climate continues to warm, powerful storms in the already wet climate of Hawaii are expected to become more frequent. Further flooding occurred on the islands in March. March 2021 was the wettest march in 15 years on Hawaii, and 11 flash flood events were reported.

*Sources:* <https://www.npr.org/2021/03/10/975602313/hawaii-flooding-prompts-emergency-declaration-evacuations-and-fears-of-dam-failu>

<https://www.cnn.com/2021/03/10/us/maui-hawaii-flooding-wednesday/index.html>

<https://www.hawaiinewsnow.com/2021/01/19/downed-trees-power-outages-reported-strong-winds-lash-parts-state/>

<https://www.cnn.com/2021/03/09/us/maui-hawaii-dam-crest/index.html>

<https://phys.org/news/2021-04-global-extreme-threaten-hawaii-coral.html>

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## Italy Eases COVID-19 Lockdown – *Biological Hazards*

**Summary:** Italy entered another widespread lockdown in response to COVID-19 in mid-March but eased restrictions in some municipalities by mid-April. The lockdown encompassed three-fourths of the nation, with the remaining sections under modified restrictions. It was instigated by a slow rollout of the vaccine and the introduction of the new variant of the virus from Great Britain. Italy currently has 506,738 active cases. In the entirety of the global pandemic, the country has experienced 3,842,079 confirmed cases and 116,366 deaths, along with 3,218,975 recoveries. All of Italy was on lockdown over Easter weekend (02-04 April 2021) to prevent large family gatherings for the holiday. On 12 April, restrictions were eased in some municipalities, with more



retail establishments reopening and additional freedom-of-movement for citizens (“orange” areas). However, other municipalities are still highly restricted based on the number of COVID-19 infections (“red” areas). Restaurants and bars are restricted to takeout orders in orange areas but closed altogether in red ones. The Italian government hopes to increase vaccinations to half a million per day by the end of April. During the first half of the month, restaurant and other small business owners scuffled with police near the lower house of Parliament, demanding to reopen permanently. Since the beginning of the pandemic, lockdowns have been implemented and rescinded based on the rate of infection, making it difficult to conduct business. The Italian government has approved a 32 billion-euro (\$38 billion) pandemic relief package for businesses. The length and severity of lockdowns is still uncertain.

**Analyst Comment:** The necessity of a new lockdown demonstrated how difficult it will be to achieve and maintain herd immunity in Italy and elsewhere. New strains of the virus are impossible to control and may thwart recovery in some countries, despite the best efforts of public health officials. However, logistical issues with vaccine distribution can be resolved over time. Italy has struggled with vaccinating its elderly population, who are among the most vulnerable. Citizens below 60 have found ways to “jump the line,” and organized crime syndicates with ties to the healthcare industry have redirected vaccines to their members and allies. The Italian government may be able to decrease the hardships brought by restrictions with economic stimuli. But the piecemeal approach to lockdowns has frustrated citizens and business owners alike. As with other countries, many are prepared to accept the risk of living and working in a world where COVID-19 is an endemic threat, even as governments and healthcare workers scramble to vaccinate the elderly and the vulnerable.

Sources: <https://www.nytimes.com/2021/03/14/world/italy-covid-lockdown.html>

<https://www.worldometers.info/coronavirus/country/italy/>

<https://www.bloomberg.com/news/articles/2021-04-09/italy-set-to-ease-lockdown-restrictions-in-most-of-the-country>

<https://www.voanews.com/europe/rome-restaurants-and-other-small-businesses-protest-covid-19-restrictions>

<https://www.bloomberg.com/news/articles/2021-03-19/italy-s-government-approves-32-billion-euro-stimulus-package>

<https://nypost.com/2021/04/12/concern-in-italy-that-mafia-redirecting-vaccine-to-friends-as-elderly-die/>



## National Weather Service Suffers Cyber Failure – *Accidental Events*

**Summary:** On 30 March, the National Weather Service (NWS) experienced a major, systemwide internet failure. The failure left meteorologists unable to access some data and prevented the public from viewing its forecasts and warnings. This event follows a multi-year history of technologic infrastructure issues within the NWS. Problems with the stability and reliability of the NWS’s information dissemination infrastructure date back to at least 2013. Recent issues have included bandwidth shortages, multiple outages to NWS Chat, and the failed launch of a radar website. In September of 2019, parts of the NWS website were down in the midst of peak hurricane season in the Atlantic. A spokeswoman at the time noted the cause of these issues to be hardware and software upgrades in addition to a security patch. Days later “major supercomputer issues” required an “emergency switch” between computers in Virginia and Orlando, delaying the output of key weather models. This also delayed the creation of up-to-date models relating to the then floods in Texas. The following day a hardware failure caused the NWS radar website to stop receiving data. In 2016 a nationwide “major network issue” prevented the agency from receiving almost any data as well as hindering efforts at the time to disseminate severe thunderstorm warnings. In 2013, a communications outage left a Weather Service forecast office “crippled” as meteorologists tried to issue warnings about severe weather.

**Analyst Comment:** The mission of the National Weather Service is to provide data, forecasts, and warnings for the protection of life and property. The online accessibility of the NWS is important to both meteorologists and the broader public to access data, view forecasts, and receive up-to-date information on severe weather events. These failures have the potential to cause injury and loss of life should they coincide with, for example, the development of a tornado or hurricane. NWS information is vital in ensuring evacuations, sheltering, and preparations are taken at appropriate times. NWS itself also relies on digital infrastructure to both receive and disseminate information. Warning and watches for thunderstorms, hurricanes, tornados, high winds, etc., are issued by the NWS and enable citizens and public officials to track and prepare for possible dangerous weather.

*Sources:* <https://www.seattletimes.com/subscribe/signup-offers/?pw=redirect&subsource=paywall&return=https://www.seattletimes.com/nation-world/nation/weather-service-internet-systems-crumbling-as-key-platforms-are-taxed-and-fail/>

<https://fox2now.com/news/nationwide-outage-affects-national-weather-service-websites-tuesday/#:~:text=The%20National%20Weather%20Service%20experienced%20a%20system-wide%20internet,with%20emergency%20managers%20and%20the%20media%2C%20was%20unavailable.>

<https://www.washingtonpost.com/weather/2019/09/19/this-is-not-rocket-science-years-after-promising-fix-national-weather-service-website-still-proves-unreliable/>

## On the Radar

- **Russia Tensions**

- The United States expelled 10 Russian diplomats and issued sanctions to several dozen individuals and companies for the SolarWinds hack and interfering in the 2020 Presidential Election. These diplomatic countermeasures impose a cost for Russia's cyberattacks, but hacks and disinformation campaigns are likely to continue. Further complicating the issue are increasing tensions in Ukraine, with Russia massing military forces in the region amidst concerns of additional hostilities.

- **Vaccines and Herd Immunity**

- Overall, roughly half of US adults have received at least one dose of the COVID-19 vaccine. Herd immunity, broadly speaking, is achieved when every person is vaccinated except those medically unable to receive it. Some observers count natural immunity (antibodies from those who have recovered from COVID-19) toward herd immunity, though there is still significant debate around the subject. In the coming months vaccination rates may hit an early plateau due to vaccine hesitancy, potentially slowing the push toward herd immunity. The Intelligence & Analysis Division will be observing vaccination rates and regional differences in the ability to reach herd immunity.

- **South China Sea: China and the Philippines**

- The Intelligence & Analysis division continues to monitor ongoing tensions in the South China Sea. Philippine President Rodrigo Duterte stated on 19 April that he was prepared to send naval vessels into the South China Sea to "stake a claim" if China were to drill for oil or extract mineral resources from the contested waters. The Philippines has recently complained that China is engaged in illegal fishing within its territorial waters, and has filed a diplomatic complaint related to such activity.